Explanatory Notes for the CLARC Tables - May 2014

1. The searchable CLARC database has been disabled. The information contained in the database is now available in an Excel spreadsheet and as several PDF documents. These contain toxicity values; Methods A, B, and C cleanup levels; Applicable or Relevant and Appropriate Requirements (ARARs); physical parameters.

2. The toxicity values have been updated to be consistent with EPA's November 2013 Regional Screening Level (RSL) tables. The list of hazardous substances in CLARC is unchanged.

3. Compared to the previous version of CLARC, the sources of toxicity values have been expanded to include those from the California Environmental Protection Agency (Cal-EPA) and the Agency for Toxic Substances and Disease Registry (ATSDR). The source of each toxicity value is listed in the Excel and PDF files using the following abbreviations:

I = IRIS (Integrated Risk Information System) database from the Environmental Protection Agency (EPA)

H = HEAST = Health Effects Assessment Summary Table from EPA

C = Cal EPA = California Environmental Protection Agency

A = ATSDR = Agency for Toxic Substances and Disease Registry

P = PPRTV = Provisional Peer-Reviewed Toxicity Values from EPA

X = PPRTV Appendix from EPA

S = Other EPA sources

Note that the oral cancer slope factor for chromium (VI) from the New Jersey Department of Environmental Protection and the oral and inhalation cancer potency factors from Cal EPA have not been included in CLARC pending further evaluation.

4. Toxicity values from Cal EPA and ATSDR (and the Methods B and C cleanup levels calculated using these values) are shown in RED FONT in the Excel and PDF files.

5. Trichloroethylene and Vinyl Chloride: Oral and inhalation cancer potency factors for these chemicals are not listed in the Excel or PDF files. Instead, the files contain links (labeled "Guidance") to guidance documents that discuss special considerations for developing cleanup levels for these chemicals. Links to the vinyl chloride guidance document also replace numerical cancer-based cleanup levels in the files.

6. Consistent with the MTCA regulation, CLARC lists inhalation cancer potency factors (CPFi) and inhalation reference doses (RfDi). These differ numerically from the similar inhalation unit risks (IUR) and reference concentrations (RfC) listed by EPA in its RSL tables. To convert:

CPFi (kg-day/mg) = IUR ($m^3/\mu g$) x (day/20 m^3) x 70 kg x 10^3 µg/mg

RfDi (mg/kg-day) = RfC (mg/m^3) x (20 m^3/day) ÷ 70 kg

7. Previously, 149 chemicals in CLARC had not been assigned an Inhalation Correction Factor, a parameter required to calculate Method B and Method C cleanup levels for groundwater. All chemicals in CLARC now have an Inhalation Correction Factor, resulting in the addition of Method B and Method C groundwater cleanup levels in CLARC for 114 chemicals.